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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
| 10/779,336 | 02/12/2004 | Mamoru Higuchi | FJHD 32 | 5225 |
| 61650 | 7590 | 01/11/2008 | | |
| MYERS WOLIN, LLC 100 HEADQUARTERS PLAZA North Tower, 6th Floor MORRISTOWN, NJ 07960-6834 | | | EXAMINER MAIS, MARK A | |
| | | | ART UNIT | PAPER NUMBER |
| | | | 2619 | |
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Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

harris.wolin@myerswolin.com
brian.myers@myerswolin.com
mail@myerswolin.com

Office Action Summary

Application No.

10/779,336

Applicant(s)

HIGUCHI ET AL.

Examiner

Mark A. Mais

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-11 is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-11 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12 February 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. ____.
 3. ☒ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. ____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>2/12/2004</u> | 6) <input type="checkbox"/> Other: ____ |

DETAILED ACTION

Priority

1. Acknowledgment is made of applicant's claim for foreign priority under 35 U.S.C. 119(a)-(d).

Information Disclosure Statement

2. The information disclosure statement (IDS) was filed on February 12, 2004. The submission is in compliance with the provisions of 37 C.F.R. 1.97. According, the examiner considered the IDS.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

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4. Claims 1-11 are rejected under 35 U.S.C. 102(e) as being anticipated by Willars et al. (USP 7,072,329).

5. With regard to claim 1, Willars et al. discloses a mobile communication system performing both radio communication to a mobile station and packet communication within the system, said mobile communication system comprising:

a plurality of nodes of a tree-shaped connection structure, having a boundary node to a different network positioned at the top [Fig. 2B, UE 30, BS 28, Interworking Node 50B, RNC 26, GGSN 20],

wherein management information [Interworking Node 50 has an internal database 52 which contains the IP addresses of UEs, col. 11, lines 37-40] of the mobile station [Fig. 2B, UE 30] is retained in an end-side node [interpreted as the combination of BS28₁₋₁ and RNC 26₁ and Interworking Node 50B (claim 6)] among the plurality of nodes [Fig. 2B, RNC 26₂].

6. With regard to claim 2, Willars et al. discloses that each plurality of nodes transfers a user data either received from a node located in the network concerned, or received from the different network and addressed to the network of interest, by use of the broadcast format to the end-side nodes, in which the user data is further transmitted to a mobile station subordinate to and managed by the end-side node, based on the management information [Fig. 2B, communications to/from Internet 14--GGSN 20—

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RNC26₁/Interworking Node 50B (w/internal database 52)—BS28_{1.1}--UE 30 via broadcast channels col. 9, lines 1-6].

7. With regard to claim 3, Willars et al. discloses that a parameter requesting to use a common traffic channel is contained in a connection request signal transmitted from the mobile station to the end-side node **[Fig. 2B, between UE 30 and BS28_{1.1}/RNC26₁/Interworking Node 50B (w/internal database 52); it is inherent to UMTS that signaling occurs for the UE to request access to a common channel; for example, using the RACH (col. 9, lines 6-10)], and by use of the parameter, the end-side node secures a transmission path for transferring the user data on the common channel provided between the mobile station and the end-side node [the UE can transmit/receive data using common traffic channels, col. 9, lines 13-16].**

8. With regard to claim 4, Willars et al. discloses that an IP address assigned to the mobile station is further contained in the connection request signal and the end-side node generates a management table having the IP address correspondingly to a number for identifying the mobile station, and the mobile station is managed on an IP address basis according to the management table **[UMTS supports both IPv4 and IPv6 on the user plane; it is inherent that the RNC would have a table of all assigned IP addresses which correspond to UEs IDs in the area it serves; for example, BS28_{1.1}/RNC26₁/Interworking Node 50B (w/internal database 52) can translate the UEs' E.164 identification to the correct IP address (col. 12, lines 13)].**

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9. With regard to claim 1, Willars et al. discloses that the end-side node comprises at least a function of managing the terminal location, a function of managing a communication path, and environment setting information necessary for establishing packet communication between the mobile station and the end-side node **[Fig. 2B, between UE 30 and BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52); it is inherent to UMTS that signaling occurs for the UE to request access to a common channel; for example, using the RACH (col. 9, lines 6-10)]** and a message transmitted from the mobile station for generating the environment setting information is terminated in the end-side node **[it is inherent to UMTS that signaling occurs for the UE to request access to a common channel; for example, using the RACH (col. 9, lines 6-10); the RNC manages the radio connection (via the base station) to/from the UE, col. 1, lines 31-34].**

10. With regard to claim 7, Willars et al. discloses that a first processing procedure registering the location of the mobile station into the end-side node by setting up a signal transmission path between the end-side node and the mobile station **[it is inherent to UMTS that signaling occurs for the UE to request access to a common channel; for example, using the RACH (col. 9, lines 6-10); the RNC manages the radio connection (via the base station) to/from the UE, col. 1, lines 31-34];**

a second processing procedure setting a mobile communication environment **[the radio connection to the base station, col. 2, lines 31-34]; and**

a third processing procedure setting up a user data transmission path **[Fig. 2B, communications to/from Internet 14--GGSN 20—RNC26₁/Interworking Node 50B**

(w/internal database 52)—BS28_{1,1}--UE 30 via broadcast channels col. 9, lines 1-6].

11. With regard to claim 8, Willars et al. discloses a mobile communication system transmitting information either addressed to or originated from a mobile station on a packet communication basis between hierarchically disposed nodes,

wherein a node disposed on the superordinate side **[Fig. 2B, interpreted as the combination of BS28_{1,1}/RNC26₁/Interworking Node 50B (w/internal database 52)]** in the hierarchy comprises a means for transmitting a packet in the broadcast format **[Fig. 2B, BS28_{1,1}/RNC26₁/Interworking Node 50B (w/internal database 52); broadcast channels col. 9, lines 1-6; further, it is inherent to UMTS that BS28_{1,1}/RNC26₁/Interworking Node 50B (w/internal database 52) has multiple transmission/reception means]** to the nodes disposed on the subordinate side **[Fig. 2B, UEs 30]**, and

a node disposed on the subordinate side in the hierarchy **[Fig. 2B, UEs 30]** comprises a means for transmitting **[Fig. 2B, UEs 30; it is inherent that UEs has transmission/reception means]** a packet to a predetermined node superordinate to the node of interest **[Fig. 2B, interpreted as GGSN 20]**, according to the information received from the mobile station **[Fig. 2B, communications to/from Internet 14--GGSN 20—RNC26₁/Interworking Node 50B (w/internal database 52)—BS28_{1,1}--UE 30 via broadcast channels col. 9, lines 1-6].**

12. With regard to claim 1, Willars et al. discloses that a node **[Fig. 2B, interpreted as the combination of BS28_{1,1}/RNC26₁/Interworking Node 50B (w/internal database**

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52)] included in a mobile communication system transmitting information either addressed to or originated from a mobile station on a packet communication basis between hierarchically disposed nodes, said node comprising:

a transmission means for transmitting a packet in the broadcast format to the nodes disposed on the subordinate side in the hierarchy; and a reception means for receiving a packet transmitted from a predetermined subordinate node [Fig. 2B, BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52); broadcast channels col. 9, lines 1-6; further, it is inherent to UMTS that BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52) has multiple transmission/reception means].

13. With regard to claim 10, Willars et al. discloses that the transmission means broadcasts a packet not addressed to a different system [Fig. 2B, BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52); broadcast channels col. 9, lines 1-6; further, it is inherent to UMTS that BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52) has multiple transmission/reception means; this is interpreted as a transmission to UE 30], and

when a received packet is addressed to the different system, the reception means transmits said packet either to the different system, or to the corresponding further superordinate node in the hierarchy [Fig. 2B, BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52); broadcast channels col. 9, lines 1-6; further, it is inherent to UMTS that BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52) has multiple transmission/reception means; this is interpreted as a transmission to GGSN 20].

14. With regard to claim 11, Willars et al. discloses a node **[[Fig. 2B, interpreted as the combination of BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52)]** included in a mobile communication system transmitting information either addressed to or originated from a mobile station on a packet communication basis between hierarchically disposed nodes **[Fig. 2B, UE 30, BS 28, Interworking Node 50B, RNC 26, GGSN 20]**, said node comprising:

a means for transmitting a packet to a predetermined superordinate node **[Fig. 2B, GGSN 20]** according to the information received from the mobile station **[Fig. 2B, BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52)]**; further, it is inherent to UMTS that **BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52) has multiple transmission/reception means; this is interpreted as a transmission to GGSN 20]**;

a means for managing the location information of the mobile station **[Interworking Node 50 has an internal database 52 which contains the IP addresses of UEs, col. 11, lines 37-40]**; and

a transmission means for transmitting a received packet having been transmitted in the broadcast format from the superordinate node in the hierarchy, to either a mobile station or a subordinate node further, when the packet is addressed to the mobile station of which location information is managed by the location information management means **[Fig. 2B, BS28₁₋₁/RNC26₁/Interworking Node 50B (w/internal database 52)]**; **broadcast channels col. 9, lines 1-6; further, it is inherent to UMTS that BS28₁**

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1/RNC261/Interworking Node 50B (w/internal database 52) has multiple transmission/reception means; this is interpreted as a transmission to UE 30].

Conclusion

15. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure:

(a) Yi et al. (USP 7,299,062), Apparatus and method for controlling access to network in wireless communication system.

(b) Latva-Aho et al. (USP 7,266,393), Connecting access points in wireless communications systems.

(c) Hwang et al. USP 7,197,333), Paging system and method for providing multicast multimedia broadcast/multicast service.

(d) Willars et al. USP 7,072,329), Combining differing transport technologies in a telecommunications system.

16. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mark A. Mais whose telephone number is 572-272-3138. The examiner can normally be reached on M-Th 5am-4pm.

17. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Wing F. Chan can be reached on 571-272-7493. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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18. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



December 11, 2007


1/4/08**WING CHAN**
SUPERVISORY PATENT EXAMINER